

3 AMENDMENTS TO THE CLAIMS

4 Claims 1 to 9 (Canceled).

5 10. (Currently Amended) ~~A self-oscillating~~ An audio Class D amplifier, comprising6 (a) a detector for receiving a PWM waveform control signal and producing a digital
7 waveform switching signal to activate one of a pair including a positive switch and
8 a negative switch to correct gain produced by the Class D amplifier;9 (b) an output stage including a positive switch and a negative switch comprising a
10 single switching output, said output stage receiving said switching signal and
11 activating one of said switches to produce a variable switching non-continuous
12 digital driving signal;13 (c) an output filter to receive said digital driving signal, remove switching noise and
14 provide an amplified non-inverting audio analog output signal to drive a load;15 (d) a non-inverting, closed loop negative feedback error amplifier circuit to
16 (i) receive said amplified analog output signal and compare said output signal
17 to said input signal for gain-correction purposes, and
18 (ii) produce said PWM waveform control signal;

19 said amplifier self-oscillating.

20 11. (Currently Amended) ~~A self-oscillating~~ An audio Class D amplifier, comprising

21 (a) a detector for receiving a PWM waveform control signal and producing a digital

1 waveform switching signal to activate one of a pair including a positive switch and
2 a negative switch to correct gain produced by the Class D amplifier;

3 (b) an output stage including a positive switch and a negative switch comprising a
4 single switching output, said output stage receiving said switching signal and
5 activating one of said switches to produce a variable switching non-continuous
6 digital driving signal;

7 (c) an output filter to receive said digital driving signal, remove switching noise and
8 provide an amplified non-inverting audio analog output signal to drive a load;

9 (d) a non-inverting, *closed loop* negative feedback error amplifier circuit to
10 (i) receive said amplified analog output signal and compare said output signal
11 to said input signal for gain-correction purposes, and
12 (ii) produce said PWM waveform control signal;

13 the operation of said amplifier slowing as the magnitude of the error in gain increases, said
14 amplifier self-oscillating.

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18 12. (Currently Amended) A self oscillating An audio Class D amplifier, comprising

19 (a) a variable frequency zero crossing detector for receiving a PWM waveform control
20 signal and producing a digital waveform switching signal to activate one of a pair
21 including a positive switch and a negative switch to correct gain produced by the
22 Class D amplifier;

23 (b) an output stage including a positive switch and a negative switch comprising a
24 single switching output, said output stage receiving said switching signal and
25 activating one of said switches to produce a variable switching non-continuous
26 digital driving signal;

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1 (c) an output filter to receive said digital driving signal, remove switching noise and
2 provide an amplified non-inverting audio analog output signal to drive a load;
3 (d) a non-inverting, closed loop negative feedback, error amplifier circuit to
4 (i) receive said amplified analog output signal and compare said output signal
5 to said input signal for gain-correction purposes, and
6 (ii) produce said PWM waveform control signal;
7 the operation of said amplifier slowing as the magnitude of the error in gain increases, said
8 amplifier self-oscillating.

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